Appendix 8. Age Pseudocode

Pseudocode for NCP Age

Step 1. Calculate Ages

Input Fields Required	Output Fields Created
NCP_Data.Case-ID NCP_Data.Date-of-Birth-NCP	DNCP_VS.Case-ID DNCP_VS.Date-of-Birth-NCP DNCP_VS.TNCP_Age DNCP_VS.Date_Created DNCP_VS.Date_Modified

Pseudocode	Notes
SELECT NCP_Data.Case_ID, NCP_Data.[Date-Of-Birth-NCP],	
Int(DateDiff("w",[NCP_Data]![Date-Of-Birth-NCP],Now())/52) AS TNCP_AGE,	**Int**—a built-in function that converts the results of the calculation to an integer. **DateDiff**—a built-in function that calculates the number of weeks between two dates, in this case, NCP_Data.Date-of-Birth-NCP and the built-in function Now (). **Now()**—current date and time. **/52**—divides the total number of weeks returned by the DateDiff function by 52 to calculate years.
Now() AS Date_Created, Now() AS Date_Modified	**Date_Created** and **Date_Modified** are computed using the Now() function and placed into the output record.
INTO DNCP_VS FROM NCP_Data;	**INTO**—destination table. **FROM**—source table.

Examples

Input

Case_ID	Date-Of-Birth-NCP
45446	2/1/1923
45447	5/1/1992
45456	2/17/1950
45457	5/26/1950

Output

Case_ID	Date-Of-Birth-NCP	TNCP_AGE	Date_Created	Date_Modified
45446	2/1/1923	79	6/11/2002 6:56:53 AM	6/11/2002 6:56:53 AM
45447	5/1/1992	10	6/11/2002 6:56:53 AM	6/11/2002 6:56:53 AM
45456	2/17/1950	52	6/11/2002 6:56:53 AM	6/11/2002 6:56:53 AM
45457	5/26/1950	52	6/11/2002 6:56:53 AM	6/11/2002 6:56:53 AM

Step 2. Determine Distribution of Ages

Input Fields Required	Output Fields Created
DNCP_VS.TNCP_Age	Report

Pseudocode	Notes
SELECT DNCP_VS.TNCP_AGE,	(Because of the way SQL is constructed, the instructions appear out of order.) **SELECT** – gathers DNCP_VS records for evaluation.
Count(DNCP_VS.TCNP_AGE) AS CountOfTNCP_AGE	**Count** – counts the number of records in each group and stores that value in a temporary field called CountOfTNCP_AGE.
FROM DNCP_VS	
GROUP BY DNCP_VS.TNCP_AGE;	**GROUP BY** – groups the records based on the value in the TNCP_Age field.

Examples	
Input	
TNCP_AGE 79 10 52 52	No other fields are required because individual record identities will be lost during the grouping operation.
Output	
TNCP_AGE 10 52 79	CountOfTNCP_AGE 1 2 1

Step 3. Code the Ages

Code the ages based on distribution information obtained in Step 2 and state needs. This example uses the distribution described in the main text.

Input Fields Required	Output Fields Created / Modified
DNCP_VS.Case-ID DNCP_VS.Date-of-Birth-NCP DNCP_VS.TNCP_Age DNCP_VS.Date_Created DNCP_VS.Date_Modified	DNCP_VS.TNCP_Age_Code DNCP_VS.Date_Modified
Pseudocode	**Notes**
SELECT DNCP_VS.* FROM DNCP_VS;	Select all fields and all records from DNCP_VS without restriction(*).
For Each DNCP_VS Do IF DNCP_VS.Case-ID is NULL THEN	
Writeln(ErrorLog, "Record Rejected – Invalid Case-ID. Date Created:",	This is a validity check that ensures the record has a Case ID.
DNCP_VS.Date_Created);	
Next Record	Break out and return to top of loop.
IF DNCP_VS.Date_Created is NULL Then	This is a validity check to ensure that the record being entered here did not skip steps.
Writeln(ErrorLog, "Record Rejected – No Date Created Value. Case ID:" ,DNCP_VS.Case-ID)	
Next Record	Break out and return to top of loop.

Pseudocode	Notes
Case Select DNCP_VS.TNCP_Age OF 12..16 : DNCP_VS.TNCP_Age_Code =“A” 17..21 : DNCP_VS.TNCP_Age_Code =“B” 22..27 : DNCP_VS.TNCP_Age_Code =“C” 28..35 : DNCP_VS.TNCP_Age_Code =“D” 36..45 : DNCP_VS.TNCP_Age_Code =“E” 46..55 : DNCP_VS.TNCP_Age_Code =“F” 56..65 : DNCP_VS.TNCP_Age_Code =“G” 66..75 : DNCP_VS.TNCP_Age_Code =“H” 76..105 DNCP_VS.TNCP_Age_Code =“I”	The select statement is a multi-condition IF statement and extremely powerful. Each TNCP_Age is evaluated and assigned the proper code.
OTHER Writeln(ErrorLog, “NCP_Age outside of acceptable range. Age listed as:” ,DNCP_VS.TNCP_Age, “Case ID: “, DNCP_VS.Case-ID) Delete Record	If the age is outside the specified range, the OTHER condition triggers an error log entry.
Next Record End Case	Break out and return to top of loop.
DNCP_VS.Date_Modified = Now() Next Record Done	Updates the Date Modified field. Loops back to top of program.

Example

Input

Case_ID	Date-Of-Birth-NCP	TNCP_AGE	Date_Created	Date_Modified
45446	2/1/1923	79	6/11/2002 6:56:53 AM	6/11/2002 6:56:53 AM
45447	5/1/1992	10	6/11/2002 6:56:53 AM	6/11/2002 6:56:53 AM
45456	2/17/1950	52	6/11/2002 6:56:53 AM	6/11/2002 6:56:53 AM
45457	5/26/1950	52	6/11/2002 6:56:53 AM	6/11/2002 6:56:53 AM

Pseudocode	Notes

Example (continued)

Output

Case_ID	Date-Of-Birth-NCP	AGE	Age_Code	Date_Created	Date_Modified
45456	2/17/1950	52	F	6/11/2002 6:56:53 AM	6/11/2002 8:50:32 AM
45457	5/26/1950	52	F	6/11/2002 6:56:53 AM	6/11/2002 8:50:32 AM
45446	2/1/1923	79	I	6/11/2002 6:56:53 AM	6/11/2002 8:50:32 AM

Note: The prefix TNCP was removed from Age and Age_Code field to save space. Also, the 10-year-old NCP was written out to the error log and the record was deleted from the transformed table (but not the input table).

NN = New Field

T = Transform Field

All field names are for demonstration purposes only. Actual field names will vary from state to state.

Functions and function names may vary from product to product.